SOUTHWEST ALASKA TRANSPORTATION PLAN

Final Edition

An approved component of the Alaska Statewide Transportation Plan



Prepared for the

Alaska Department of Transportation and Public Facilities

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November 25, 2002

Greetings:

I am pleased to present the *Southwest Alaska Transportation Plan*, the latest publication in a series of area transportation plans for particular regions of the state of Alaska.

When we began envisioning a Southwest Alaska Transportation Plan in 1997, we at the Department of Transportation and Public Facilities had a notion of what we were up against. We knew we had to figure out how we could best share the *Tustumena* between its Southwest Alaska service and its service to Prince William Sound communities. We knew in the near-term we could expect ever-dwindling operation budgets with which to maintain the region's many airports. And we knew that the transportation facilities we maintained were critical to survival of the communities they served, and that reduced service was unacceptable to our constituents. What we didn't know was how to turn things around.

The planning process helped us prioritize the region's transportation infrastructure and see how transportation links could contribute to Southwest Alaska's economy by improving transportation efficiencies. With the region's residents, we worked to map out a desirable network of routes linking communities. Then we applied transportation and economic analysis to see how these might be developed in a sustainable fashion. The plan's recommendations are modest; but they are important first steps, and they are achievable.

The plan was developed using an extensive public involvement process. This included an Advisory Committee made up of community leaders. Their interaction with one another enabled them to focus on transportation solutions that brought benefits to the entire region rather than only to their individual communities. Additionally we maintained a website on the plan where we responded to inquiries from the general public and provided technical documents for viewing by interested individuals.

The plan recommends investment in a number of port facilities, and in a few critical road links. These links permit consolidation of service between multiple communities, encourage intermodal efficiencies, and promote regional economic diversification. In addition, the plan furthers a continuing effort to upgrade all state-owned and operated airports to approved standards of width, length, lighting and navigation in order to improve overall aviation safety. By far the great majority of future transportation projects in the region will continue to be airport-related.

This plan draws its authority from Alaska Statute 44.42.050 and is an element of the Statewide Transportation Plan as defined in 23 CFR 450.214. I am proud to hereby authorize the Southwest Alaska Transportation Plan.

Joseph L. Perkins, P.E.

Commissioner

Sincerel

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Preface

This document presents the Southwest Alaska Transportation Plan, which culminates a fouryear effort to define and select a blueprint for the region's long-term transportation future. The Alaska Department of Transportation and Public Facilities (DOT&PF), as the State agency responsible for highways, ferries, airports and ports and harbors, undertook this effort to ensure that future investments in the region's transportation are in the best overall public interest.

This plan is one of a series of regional, multi-modal transportation plans being undertaken for Alaskan communities. It forms part of the Statewide Transportation Plan and presents the project recommendations for the Southwest Alaska region. This plan draws its authority from Alaska Statute 44.42.050, which requires DOT&PF to prepare plans for transportation facilities, and is also an element of the Federally-required Statewide Transportation Plan as defined in 23 CFR 450.214. The Federal requirement is important, as Federal transportation funds must be allocated consistent with transportation plans prepared following Federal guidelines.

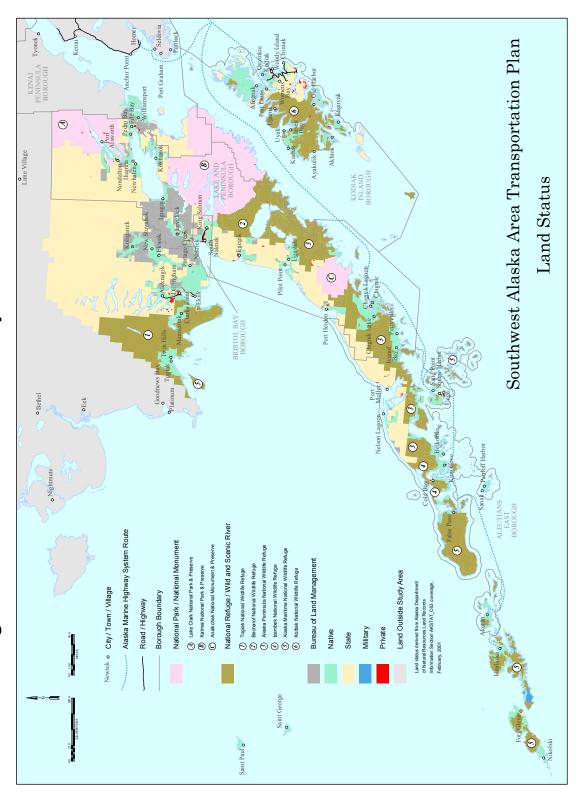
The Southwest Alaska Transportation Plan is not about changing services and facilities for the sake of change. Rather, it reflects a broad-based effort that seeks to improve year-round mobility and access for residents, and to broaden and diversify the region's transportation network. This effort necessarily explored potential road, rail, aviation and marine transportation options in seeking to lower the costs of moving goods and remove barriers to regional economic development and coordination.

Because of the remote and largely undeveloped character of the region, conventional methods for determining the value of system improvements used in typical urban and rural settings were not helpful. Rather, the planning team examined the region's geographical, economic and socio-political characteristics and envisioned the corridors that would link the communities together. The multi-modal analysis then proceeded to determine the most economical sequence for establishing infrastructure and the most suitable facilities to employ.

We concede that some infrastructure improvements recommended in these pages may not "pay for themselves" using typical methods used to assess costs and benefits over a 20-year timeframe. The question is much more basic: "What transportation infrastructure is needed to provide a stable economic climate in the region, and how is the best way to go about investing in it?" Transportation is intrinsic to the region's economic vitality, providing the necessary mobility to make the difference between self-sufficiency and dependency. The Southwest Alaska Transportation Plan begins the long process of infrastructure development in the region.

This infrastructure will lower the per-person costs of government services, enhance the region's economic outlook, and improve the quality of life and future of the region's families and businesses.

This document does not portray the sum total of the planning effort, but rather a summation of the findings and key processes. The supporting technical memoranda prepared over the course of planning are numerous, each representing the findings up to the point when it was published. Due to the limited planning budget, the technical memoranda were not revised to bring them up-to-date, but new findings were incorporated into each subsequent product. These documents can be accessed and downloaded through DOT&PF's website (http://www.dot.state.ak.us) or can be sent in CD form upon written request.



Executive Summary

The Southwest Alaska Transportation Plan aims to provide the framework for a sustainable transportation system that will improve the ability of residents to move between communities in Southwest Alaska. Removing restrictions to economic growth is also a goal. The plan prioritizes key projects in order to bring real benefits to both region and state. In doing so, it does not simply look at the benefits accrued by community, but rather to the aggregate of communities in the region and to the state as a whole.

Thus it employs a systematic approach to developing the region's transportation network, and this approach involves a vision that extends beyond what is economically feasible within the constraints of a 20-year transportation plan. The plan's recommendations contains eight key components:

Corridor delineation

This component involves the denoting of several actual and potential transportation <u>corridors</u> in order to:

- Establish the validity of a transportation interest, and to
- Protect and ensure consideration of that interest in current and future land use decisions.

Many of these corridors are not feasible today. The purpose for the delineation is to establish each corridor's future importance to the region.

Selected community linkages

These include <u>projects</u> that provide a necessary element to completing the surface link between community pairs. In the near term, the plan recommends the following projects:

- Williamsport Pile Bay roadway improvements
- Kodiak road to launch complex
- · Chigniks intertie
- King Cove Cold Bay connection

Additionally, the plan recommends a <u>unique study</u> combining airport planning and roadway analysis to determine the net benefit of some potential surface links and their impact on air travel. This study is needed to assist in assessing the impact of a road link on air traffic and aviation facility use. It will help determine a fair and appropriate role of local and state investment:

Naknek/South Naknek/King Salmon road link and area aviation needs study

Finally, the plan suggests <u>triggers</u> for reevaluation of lower-priority links in each corridor that could lead to their development within the 20-year period considered by this plan.

Intermodal development

The plan recommends <u>project sets</u> with potentially high impact because they immediately improve the economics of transportation connectivity from the region to its markets. These project sets include:

- Williamsport Pile Bay (port and roadway improvements)
- Chignik (port improvements, roadway intertie, airport master plan)

Improved Marine Highway service

This element is a by -product of Prince William Sound Transportation Plan implementation, releasing *M/V Tustumena* from service within Prince William Sound and allowing more of its service hours to be devoted to Southwest Alaska. A necessary part of this element includes dock improvements needed for *Tustumena* operations, including these facilities:

- Kodiak
- Chignik
- Unalaska.

Aviation system improvements

The plan endorses a minimum standard for community airport runway length (3300 ft). It includes an analysis of projected regional aviation needs. Its purpose is to provide an indication of when updated individual airport assessments should be undertaken in anticipation of needed runway lengthening. In Southwest Alaska and elsewhere in the state there is a recurring conflict between community desires for larger airport facilities and the limitations of state funds for maintaining and operating them. The plan provides a methodology for resolving these issues at the individual airport level. This approach improves planning flexibility, permitting community input to be factored into airport improvement projects and the additional costs appropriately assessed by local-state agreement.

Port and harbor improvements

The plan seeks to draw attention to needed port improvements, in particular those that provide an intermodal complement to key transportation infrastructure. Of note, the plan discusses Williamsport navigation improvements and dock facility, Pile Bay dock and boat launch facility, Chignik public dock facility, Unalaska city dock improvements, and Kodiak city dock improvements.

Marked winter trail system

This element provides a system of trail markers that permits safe travel by snowmachine between Bristol Bay communities during the winter months.

Validation of previous approved and ongoing projects

Finally, the plan recognizes several ongoing road and aviation projects in various stages of development. These projects are recognized for their significant role in enhancing the region's transportation.

- Dillingham Aleknagik Road and Wood River Bridge
- Iliamna Nondalton Road

Each of these eight components is discussed in more detail in the following pages.

Corridor Delineation

Southwest Alaska's lack of transportation infrastructure leaves most communities isolated and disconnected from each other. The unifying transportation system is a collection of small airstrips at each community maintained primarily by the State of Alaska at considerable expense. But the system is not self-sufficient. Most communities are unable to afford the expense of maintaining their own airstrips. Air travel for residents is very expensive and the bypass mail system employed by the U.S. Postal Service operates at deficit. Clearly this "system" is necessary for the communities supported by it, but it lacks the ability, by itself, to attain a degree of self-sufficiency.

The purpose of corridor delineation is to recognize the patterns of existing travel and desired travel in the region and to establish and protect the surface transportation "highways" that would best serve the region's long-term social and economic infrastructure needs. The plan recognizes four primary corridors, shown in Figure S1:

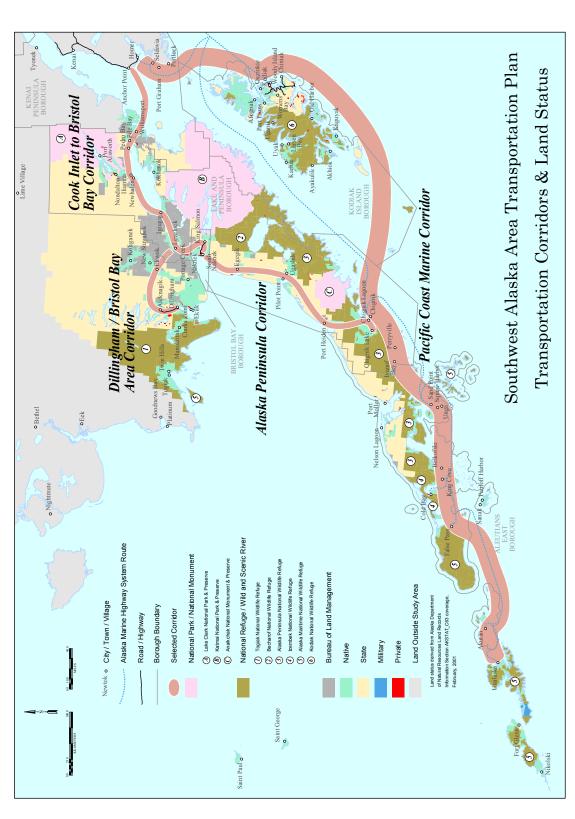
- Pacific Coast Marine corridor
- Cook Inlet to Bristol Bay corridor
- Alaska Peninsula corridor
- Dillingham/Bristol Bay Area corridor

A number of historic and traditional use corridors documented in earlier studies remain significant to individual communities. For example, the *Bristol Bay Area Plan* (Alaska Dept of Natural Resources, 1984) specifically identified three "preferred corridors" (Pilot Point- Wide Bay, Port Heiden-Kujulik Bay, and Port Moller-Balboa Bay) as well as the King Cove-Cold Bay road. Delineating the four key regional transportation corridors in no way invalidates these earlier studies, and there remains a continued state interest in them.

Pacific Coast Marine Corridor

The Pacific Coast Marine Corridor connects the communities of Kodiak Island, the fishing communities on the eastern side of the Alaska Peninsula, and the port of Dutch Harbor. This corridor ties into the Alaska road/rail network through the port of Homer. As the name implies, this corridor serves marine transportation needs, including tug and barge service, the Alaska Marine Highway System, and commercial fishing interests.

Figure S1. Transportation Corridors



Cook Inlet to Bristol Bay Corridor

The Cook Inlet to Bristol Bay Corridor connects the rich seafood resources and communities in Bristol Bay, as well as the Iliamna Lake communities, with resupply, support and market centers in the Alaskan railbelt. It consists of a marine segment (Cook Inlet), intermodal transfer location at Williamsport, and then primarily overland and riverine routes along Iliamna Lake and the Kvichak River valley to the port town of Naknek on Bristol Bay. Its function is primarily logistical. Transportation improvements along this corridor would lower the cost of transport, thus yielding benefits to the quality of life of residents and helping to stimulate economic growth.

Alaska Peninsula Corridor

The Alaska Peninsula Corridor is an overland corridor linking the communities of the Alaska Peninsula from Ivanof Bay to Naknek. The key facility in this corridor is the port at Chignik, from which fuel and supplies can be disbursed to other communities via road connection. From Chignik the corridor extends west along the Gulf of Alaska coast to Perryville and Ivanof Bay. It also extends from Chignik to Chignik Lake and Chignik Lagoon, then crosses the Alaska Peninsula to Port Heiden. From Port Heiden the corridor extends north, connecting Pilot Point, Ugashik, Egegik and South Naknek, and tying into the Cook Inlet to Bristol Bay Corridor at Naknek.

Dillingham/Bristol Bay Area Corridor

The Dillingham/Bristol Bay Area Corridor is an overland corridor connecting the port city of Dillingham to the Cook Inlet to Bristol Bay Corridor. It includes a crossing of the Wood River at Aleknagik and a major crossing of the Nushagak River. There are several possible tie-in locations to the Bristol Bay to Cook Inlet corridor. The plan models a corridor from Aleknagik to Igiugig via Levelock.

Selected Community Linkages

Given the above listed corridors, the plan's next task is to select the portions of each corridor that provide the greatest near-term benefit. Several projects are recommended.

Williamsport to Pile Bay Roadway Improvements

The existing road between Williamsport and Pile Bay is already in use for the transport of fishing vessels from winter refitting in Homer to the summer fishing grounds in Bristol Bay and back. Much of the time it is the only route that provides access for heavy equipment to reach the Iliamna area. The road itself has not been adequately maintained over the years, is exceedingly narrow in places, and several bridges need upgrading. But the reason the plan endorses this project is because of its value. Coupled with navigation improvements at Williamsport and a public-use dock and ramp at Pile Bay, this route becomes the essential conduit for the movement of freight and commodities via barge from the railbelt to the communities around Iliamna. The potential volume of fishing vessels being transported to and from Bristol Bay increases as well. Improving this facility immediately lowers costs to users and residents and opens the Cook Inlet to Bristol Bay corridor to new transportation possibilities in the private and public sector.

Kodiak Road to Launch Complex

The existing road from Kodiak to the launch complex and Coast Guard LORAN station at Narrow Cape provides a key strategic link from airport and port facilities in Kodiak in support of State and national strategic (defense and economic) interests. The importance of this link is expected to grow in the coming years. The project (Figure S2) involves improvement of Chiniak Road from Womens Bay to the intersection of Pasagshak Road, and improvement of Pasagshak Road from Chiniak Road to Narrow Cape.

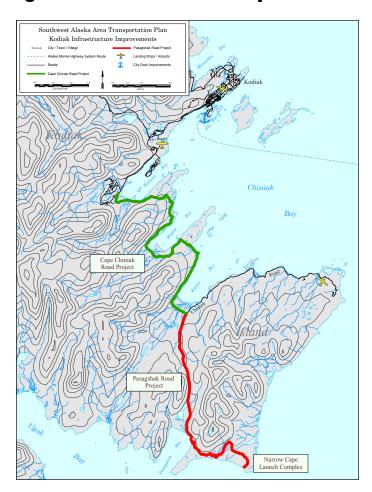


Figure S2: Kodiak Road Improvements

Chigniks Intertie

A road connecting the three nearby communities of Chignik, Chignik Lake and Chignik Lagoon is expected to improve overall transportation reliability and safety, as well as encourage economic efficiency and consolidation of community services. This project complements the construction of a municipal dock at Chignik, and makes delivery of heating fuel to Chignik Lake and Chignik Lagoon less costly and more certain. Additionally, this project makes possible the consolidation/expansion of aviation services at one or more airports to make air travel more dependable and safe for the residents of all three communities.

King Cove - Cold Bay Connection

This plan recognizes the need for a viable and practical surface (overland and/or marine) transportation link between the communities of King Cove and Cold Bay, and endorses the findings of the King Cove-Cold Bay Facilities Concept Report and Assessment of Transportation Need (DOT&PF, 1999). It supports further efforts by both communities to refine and implement a near-term, workable transportation solution.

Naknek/South Naknek/King Salmon road link and area aviation needs study

A surface link spanning the Naknek River and connecting the three communities of Bristol Bay Borough (see Figure S3) is desirable for many reasons. However, further study is warranted to better identify the range of services affected and the overall savings such a project would mean for the State and the Borough. Additionally, completion of this project would be expected to affect aviation use patterns and the priority of aviation operations and improvements at individual airport facilities.

Therefore, the plan proposes a multi-modal needs study to define appropriate level of aviation investment, and to examine the distribution of costs and benefits among various interests. The study's purpose is to assist in the formulation of a project financing plan and determination of responsibility for ownership and/or operation and maintenance of facilities.

The needs study is not considered a necessary prerequisite for commencing design, engineering, and environmental work on the Naknek bridge project.

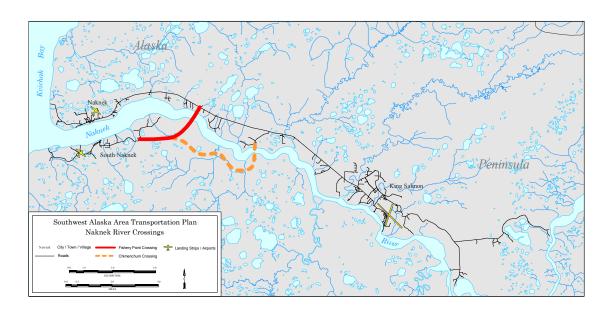


Figure S3: Naknek Area road link

Triggering consideration of other links

Development of surface transportation links in the corridors other than those listed in the previous section is considered unlikely during the upcoming 20-year timeframe because of the perceived high investment cost and the relatively low benefit yield (due to small size of populations affected). However, circumstances could occur that might prompt a fresh look at one or more of these links:

- Rapid population growth in one or both communities connected by the potential link, or a combined population rise to double the figure forecasted for year 2020 (see Table 2).
- Discovery of high value resource that could potentially be accessed economically through development of the link.
- Major business/economic development in one or both communities connected by the potential link.
- Availability of new transportation technology that dramatically reduces capital and/or operating costs for a particular link
- Catastrophic natural disaster that alters normal transportation development pattern.

Should any of these eventualities occur during the life of the plan, the State of Alaska may consider a redetermination of the need, benefits and costs of the link(s) in question.

Intermodal Development

The plan stresses the importance of recognizing the interrelationship of transportation infrastructure and the need to develop facilities in a way that enables them to complement each other and multiply their benefit to users. The plan examines the corridors and focuses on key locations for region entry and exit. If the transportation facilities in these locations are more fully developed, benefits generate more readily, and these benefits are passed indirectly to other communities. Eventually, benefits generated by transportation development at these locations may be sufficient to justify extending infrastructure to the next location along the corridor.

Key locations where interdependency of modes already has a strong influence on the regional economy and infrastructure include Unalaska, Kodiak, Dillingham, Naknek/King Salmon, Iliamna and Cold Bay. The plan encourages projects that recognize the intermodal interdependency at these locations and help to improve overall system efficiency.

Key underdeveloped locations for region entry cited in the plan include **Williamsport** for the Cook Inlet to Bristol Bay Corridor, and **Chignik** for the Alaska Peninsula Corridor. The plan proposes **project sets** that capitalize on improving the accessibility, safety, reliability, and the overall utility of these locations for the movement of goods and services.

Project Set: Williamsport - Pile Bay

The Williamsport - Pile Bay project set (Figure S4) focuses on what is currently the "weak link" in the Cook Inlet to Bristol Bay Corridor, and recognizes the potential for greater transportation use of the lake and river systems from Iliamna Lake to Bristol Bay if this link were improved upon. Emphasis is placed on:

Marine access to Williamsport and efficient intermodal transfer

- Safe, reliable overland transport
- Efficient intermodal transfer at Pile Bay

Thus the project set involves the **simultaneous development and implementation** of several projects:

- Williamsport Navigation Improvements and transfer facility
- Williamsport Pile Bay Road Improvements (discussed earlier), and
- Pile Bay Public-use dock and transfer facility

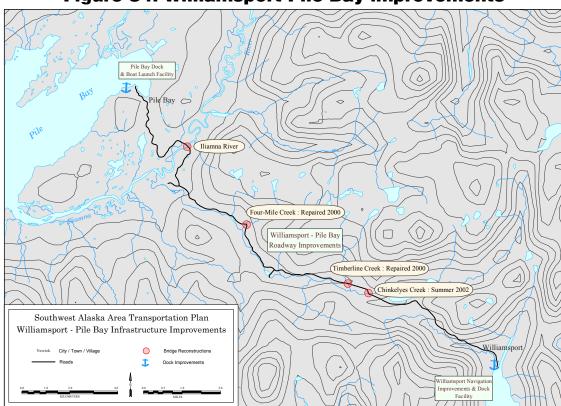


Figure S4: Williamsport-Pile Bay improvements

Project Set: Chigniks

The Chigniks project set (Figure S5) focuses on the potential for economic development through improved transportation efficiency, accessibility, and reliability. It recognizes:

- Inadequate access and structural integrity of Chignik commercial dock
- Close proximity of three communities
- Low reliability of scheduled air service and limited ability to improve existing facilities

The Chigniks area depends on both marine and air transportation. Currently these services operate independent of one another. The project set helps to promote their interdependence and creates new efficiencies and opportunities for economic growth. The project set includes:

- Chignik municipal dock and fuel tank farm
- Chigniks road intertie (discussed earlier)
- Chigniks area airport master plan

The road intertie project has independent utility, but is made more effective economically and regionally by the municipal dock. The area airport master plan should accompany the road project, as a number of aviation safety improvements are needed now at the three community airports. The area concept starts with the assumption that the intertie road is in place, therefore compelling an interdependent examination of aviation needs for all three communities.

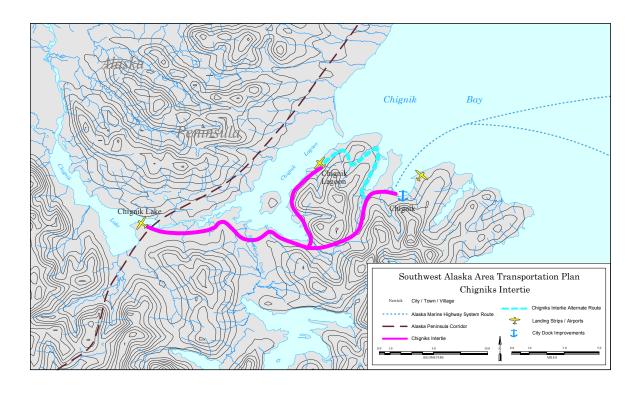


Figure S5: Chignik Area improvements

Improved Marine Highway Service

The residents of Southwest Alaska have long expressed the desire for additional AMHS service. Whatever the practicalities, however, the option was not available due to the shared use of the ocean-going ferry *Tustumena* between Prince William Sound and Southwest Alaska. With the implementation of the *Prince William Sound Transportation Plan* (DOT&PF, 2001), *Tustumena* will no longer be needed for service in Prince William Sound. The plan proposes

that the service hours thus freed be devoted to Southwest Alaska service. This should include additional trips between Kodiak and the mainland and additional trips between Kodiak and Unalaska (and points between).

As a result, several shore facilities in the region will see significantly increased use by AMHS and are cited in the plan for upgrades or new facilities to support increased operational demands. These include dock improvements at:

- Kodiak Relocate Municipal Dock
- Chignik Construct Municipal Dock
- Unalaska Improve Unalaska Marine Center Dock Position 1

These improvements are discussed further in the subsequent section on Ports and Harbors.

Aviation System Improvements

Aviation plays a vital role in the transportation of Southwest Alaska. For most of the communities in the region, air transportation currently represents the only practical means of movement between communities, and for all of them it represents the only practical entry into and exit from the region. For this reason alone, aviation system safety in the region is of primary importance.

The region has 66 airports, including 13 seaplane facilities. DOT&PF owns, operates and maintains 42 of these. Several of the region's airports serve as hubs for the distribution of mail and air cargo to surrounding communities.

The plan examines the strengths and weaknesses of this system, as well as the present and potential consequences of current aviation policies and planning. The plan's recommendations are geared to strengthening aviation system safety, reliability, and efficiency, and can be broadly categorized into three themes:

- Minimum runway length. The plan recognizes the Alaska Aviation Coordination Council recommendations for a minimum runway length design of 3300 feet and all-weather approach and landing capability for public airport rural access within the state. At the same time, the plan recognizes the regional significance of several hub facilities, and the need for ongoing improvements to these facilities that may have greater urgency and priority over lengthening a below minimum standard runway at some other location.
- **Design aircraft.** The plan forecasts future aviation demand in the region, and examines trends in the aviation industry to assist in the selection of design aircraft for airport master planning purposes.
- **Intermodal emphasis.** The plan highlights interrelationships between aviation and marine freight, and stresses coordinated planning in order to improve efficiencies and lower costs.

Additionally, several broad policy issues were discussed and highlighted during the planning process. While the plan's purpose is not to rewrite statewide aviation policy, nevertheless the discussions served to enlighten understanding of the region's aviation needs and challenges,

and are carried forward for future aviation system planning at the statewide level. These issues include:

- USPS bypass mail carrier selection
- Rising insurance costs and effect on passenger air service
- Minimum design standards for medevac
- Consideration of "non-essential" needs (i.e. air carrier concerns, community desires) in airport improvement design and statewide project scoring. In Southwest Alaska and elsewhere in the state there is a recurring conflict between community desires for larger airport facilities and the limitations of state funds for maintaining and operating them. The plan provides a methodology for resolving these issues at the system and individual airport level. This approach, on page 12, improves planning flexibility, permitting community input to be factored into airport improvement projects and the additional costs appropriately assessed by local-state agreement.

Port and harbor improvements

The thrust of this element is addressed in the earlier elements. It is mentioned separately because of the unique problem of securing funding for port and harbor projects. The facilities singled out for attention include:

- Williamsport Navigation improvements and dock facility
- Pile Bay public dock and boat launch facility
- Chignik public dock facility and fuel tank farm
- Unalaska city dock improvements
- Kodiak city dock improvements

Each of these is discussed briefly in order to emphasize their importance to achieving the plan's objectives.

Williamsport Navigation improvements and dock facility

The basic scope of this project is addressed in the report *Navigation Channel Feasibility Report* and *Environmental Assessment: Williamsport* (US Army Corps of Engineers Alaska District, December 1995). The report describes a 2500-meter dredged channel with a 55 -meter wide turning basin, a 30-meter face sheetpile dock and 12-meter wide boat launch ramp. The facility would be accessible at extreme high tides, weekly by landing craft and twice monthly by tug and barge. This access frequency is well suited to meeting the freight needs of the Iliamna Lake communities for the foreseeable future.

Pile Bay public dock and boat launch facility

This project is a necessary part of the Williamsport-Pile Bay road project. The current road terminates on private property owned by the Iliamna Transportation Company. A necessary precondition for road improvements is reasserting public right of way throughout the entire road

corridor. At Pile Bay this most likely will involve realigning the road and identifying a suitable site for a dock and boat launch ramp facility. The facility characteristics could be very similar to the Williamsport dock and launch ramp, except that in Pile Bay no need for a dredged channel or turning basin is anticipated.

Chignik public dock complex

The Chignik public dock concept is described in the City of Chignik report *Economic Feasibility Study of Chignik City Dock and Related Infrastructure* (Northern Economics, Inc./Peratrovich, Nottingham, and Drage, Inc., Nov 2001). The report calls for a publicly-owned dock complex including vehicle staging area, boat stowage, marine repair facilities, refueling facilities, and a regional bulk fuel tank farm. The tank farm was completed in 2001 with funding provided primarily from the Denali Commission.

The project meets a long-term need for unrestricted marine access to dock facilities at Chignik. It could also meet the need for a safe and reliable mooring facility for the Alaska Marine Highway system, whose vessels now must moor to aging processor facilities with a questionable remaining service life. The Department of Community and Economic Development has sponsored the project for a number of years, but heretofore the significant amount of capital funds needed to design and build the project has not been made available.

The Southwest Alaska Transportation Plan moves this project out of the realm of a community-level improvement and into statewide significance by demonstrating the strategic importance of the port through a systems analysis. The plan expresses the importance of Chignik as a marine hub for the lower Alaska Peninsula, making possible further infrastructure improvements to the neighboring communities, lowering costs of freight and fuel distribution, and creating a climate for economic growth and improved quality of life.

Unalaska city dock improvements

This project replaces Position 1, an aging pile-supported wooden portion of the Unalaska Marine Center (UMC) that is used for general cargo and AMHS ferries. The dock replacement would entail a sheet pile cell dock with improved backreach queuing and parking areas. This project will improve cargo handling and storage and staging at the UMC. This improvement, coupled with ongoing road improvements between dock and airport, enhances Unalaska's intermodal efficiency and significantly improves safety for AMHS ferry landings.

Kodiak municipal and ferry dock

This project concept recognizes the significant need for a replacement dock facility for AMHS ferry landings, particularly in view of increased ferry service recognized in this plan as an outgrowth of PWS Transportation Plan implementation. In addition it also recognizes the need for a more capable dock facility in Kodiak to replace the aging and difficult-to-access municipal dock.

Marked Winter Trail System

The need for a permanent, marked winter trail system connecting villages for wintertime access by snowmobile and/or dogsled is validated. This trail system interconnects with the Yukon-Kuskokwim trail system at Goodnews Bay. It connects all of the communities north of Bristol Bay and has its southern terminus in Naknek. The trail system (Figure S6) is an essential mode

of transportation between communities during the winter months, and requires ongoing maintenance and upkeep.

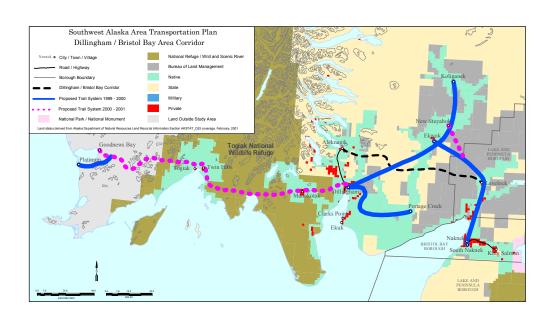


Figure S6: Southwest Alaska Winter Trail System

Validation of previous approved and ongoing "Baseline" projects

Several ongoing road and aviation projects are already in various stages of development. The Southwest Alaska Transportation Plan validates the established need for these projects and further calls attention to their significant role in enhancing the region's transportation. They include:

- Dillingham Aleknagik Road and Wood River Bridge
- Iliamna Nondalton Road

Dillingham - Aleknagik Road and Wood River Bridge

Completion of the Dillingham - Aleknagik Road (Figure S7) will provide Aleknagik residents better access to the regional airport at Dillingham, and lessen dependency upon the Aleknagik airport for critical transportation needs, and improves safety by providing a safe alternative to flying in marginal conditions. Completing the road connection enhances Aleknagik's role as a jumping-off point for recreation opportunities. Additionally, consolidation of some services and improved commerce between the communities is made possible.

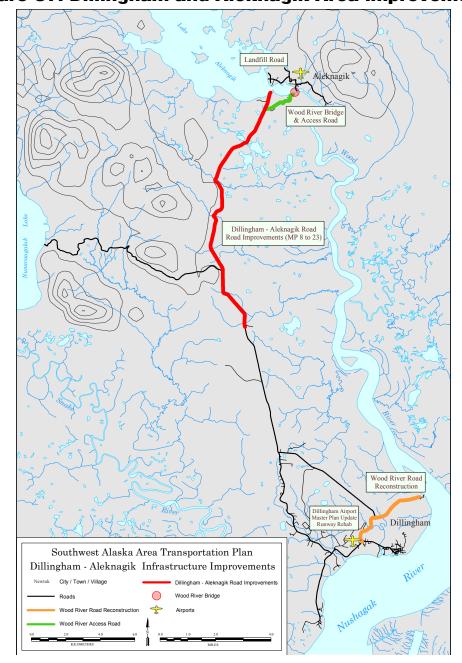


Figure S7: Dillingham and Aleknagik Area improvements

Iliamna - Nondalton Road

Completion of this project (Figure S8), which includes the Newhalen River Bridge and upgrade improvements to the existing roadway between the communities of Iliamna and Nondalton, improves Nondalton residents' access to Iliamna's regional airport and lowers costs to Nondalton residents for goods and services. It lessens dependence upon Nondalton's small community airport, provides a safer transportation conveyance in marginal conditions, and improves the economic climate in both communities. The improved economic and business climate created by the connecting these communities highlights the need for improving the freight corridor between Williamsport and Pile Bay.

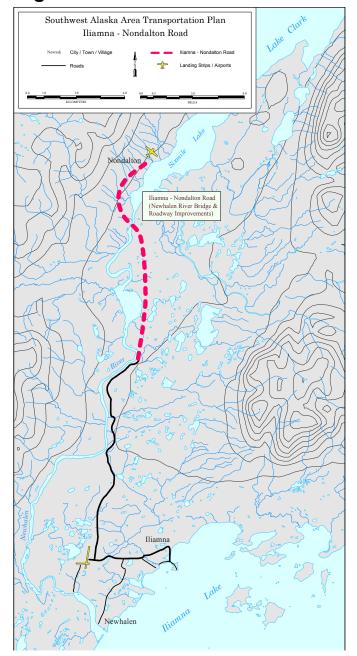


Figure S8: Iliamna-Nondalton Road

Summary

The Southwest Alaska Transportation Plan establishes a framework for systematic transportation implementation in the region over the course of many years. By pointing out desirable corridors and highlighting interrelationships and dependencies, the plan provides not only a prioritized sequencing of recommendations, but also the necessary justification for carrying those recommendations through to completion.